

WE CLAIM:

1. A parathyroid hormone solution comprising:
 - (a) a therapeutically effective amount of a parathyroid hormone;
 - (b) an effective amount of a stabilizing agent;
 - (c) a buffering agent in an amount sufficient to maintain the pH of the composition within a range of about 3-7; and
 - (d) the balance being water.
2. The solution of claim 1, wherein the hormone is a fragmented hormone selected from the group consisting of PTH(1-34), PTH(1-37), PTH(1-38), and PTH(1-1041).
3. The solution of claim 1, wherein the hormone is human PTH(1-34) (SEQ ID NO: 2).
4. The solution of claim 1, wherein the hormone is human PTH(1-84) (SEQ ID NO: 1).
5. The solution of claim 1, wherein the stabilizing agent is a polyol.
6. The solution of claim 5, wherein the polyol is mannitol.
7. The solution of claim 5, wherein the polyol is propylene glycol.
8. The solution of claim 1, wherein the buffering agent is an acetate or tartrate source.
9. The solution of claim 8, wherein the buffering agent is acetate.
10. The solution of claim 1, which further comprises a parenterally acceptable preservative.
11. The solution of claim 10, wherein the preservative is m-cresol or benzyl alcohol.

12. The solution of claim 11, wherein the preservative is m-cresol.
13. A composition according to claim 1, in the form of a freeze-dried powder containing less than 2% water by weight.
14. A parathyroid hormone solution comprising:
 - (a) a therapeutically effective amount of a parathyroid hormone;
 - (b) from about 1 to 20 wt-% of a stabilizing agent;
 - (c) a buffering agent in an amount sufficient to maintain the pH of the composition within a range of about 3-7 and selected from an acetate ortartrate source;
 - (d) from about 0.1 to 2 wt-% of a parenterally acceptable preservative; and
 - (e) the balance being water.
15. The solution of claim 14, wherein the hormone is PTH(1-84).
16. The solution of claim 14, wherein the hormone is selected from the group consisting of PTH(1-34), PTH(1-37), PTH(1-38), and PTH(1-41).
17. The solution of claim 16, wherein the hormone is human PTH(1-34) (SEQ ID NO: 2).
18. The solution of claim 14, wherein the stabilizing agent is a polyol in an amount of about 3 to about 10 wt-%.
19. The solution of claim 14, wherein the preservative is m-cresol or benzylalcohol in an amount of about 0.3 to about 1.0 wt-%.
20. A phannaceutical composition in the form of a freeze-dried powder comprising:

- (a) a therapeutically effective amount of a fragmented parathyroid hormone selected from the group consisting of PTH(1-34), PTH(1-37), PTH(1-2038), and PTH(1-41);
- (b) an effective amount of a stabilizing agent;
- (c) a buffering agent in an amount sufficient to maintain the pH of the composition within a range of about 3-7; and
- (d) less than 2 wt-% water by weight.
21. The composition of claim 20, wherein the hormone is human PTH(1-34) (SEQ ID NO: 2).
22. The composition of claim 20, wherein the stabilizing agent is selected from the group consisting of glycine, mannitol, sucrose, trehalose, raffinose and a mixture thereof.
23. The composition of claim 20, wherein the buffering agent is an acetate or tartrate source.
24. The composition of claim 23, wherein the buffering agent is a tartrate source.
25. The composition of claim 20, wherein the stabilizing agent is in an amount of about 1 to about 20 wt-%.